



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/552,301	10/07/2005	Torayuki Tsukada	10921.359USWO	8326
52835 7590 12/12/2007 HAMRE, SCHUMANN, MUELLER & LARSON, P.C. P.O. BOX 2902 MINNEAPOLIS, MN 55402-0902			EXAMINER BAISA, JOSELITO SASIS	
			ART UNIT 2832	PAPER NUMBER
			MAIL DATE 12/12/2007	DELIVERY MODE PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	Application No. 10/552,301	Applicant(s) TSUKADA, TORAYUKI	
	Examiner Joselito Baisa	Art Unit 2832	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 06 September 2007.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-9 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 07 October 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1-9 are rejected under 35 U.S.C. 102(b) as being anticipated by Toshihiro [JP 08064401].

Toshihiro discloses resistor element 4 including an electrode-forming a surface 1; at least two electrodes (2, 3, 6 on both ends) provided at the electrode forming surface 1; and an insulating layer 8 provided at the electrode-forming surface 1; wherein the electrode-forming surface 1 includes an inter-electrode region positioned between the two electrodes (2, 3, 6 on both ends) and covered by the insulating layer 8, and wherein the insulating layer 8 has a thickness which is equal or generally equal to a thickness of the electrodes [Abstract, Figure 1; Paragraph 14].

With respect to claims 5 and 7-9, the claims are method counterpart of structure of claim 1 and method steps therefore are inherent for manufacturing a chip resistor.

Regarding claim 2, Toshihiro discloses the thickness of the insulating layer 8 is smaller than the thickness of the electrodes, and wherein difference between the thickness of the insulating layer 8 and the thickness of the electrodes is so set that, when the resistor element

flexes upon receiving a load, the insulating layer comes into contact with a flat mount surface before the resistor element is damaged [Page 4, Paragraph 15].

Regarding claim 3, Toshihiro discloses the thickness of the insulating layer is smaller than the thickness of the electrodes, and wherein difference between the thickness of the insulating layer and the thickness of the electrodes is set to be smaller than maximum deflection of the resistor element when maximum bending stress produced in the resistor element reaches elastic limit of the resistor element [Page 4, Paragraph 15].

Regarding claim 4, The chip resistor according to claim I, wherein the insulating layer 8 is formed by thick film printing [Abstract, Paragraph 14].

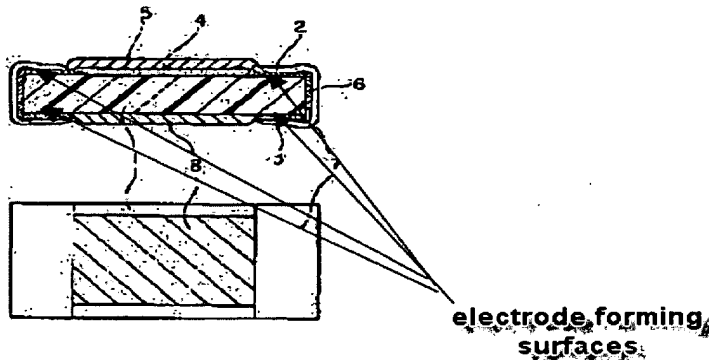
With respect to claim 6, the claim is a method counterpart of structure of claim 4 and method steps therefore are inherent for manufacturing a chip resistor with an insulating layer.

### ***Response to Argument***

Applicant's arguments with respect to claims 1-9 have been considered but are not persuasive.

Applicant argues, with regards to claim 1, that the reference Toshihiro has a substrate 1 that is not a part of resistor layer 4 and that it cannot be a part of the electrode-forming surface. Applicant further argues that Toshihiro cannot disclose at least two electrode provided at an electrode forming surface.

Applicant recites in claim 1 "...a resistor element including an electrode-forming surface...". Toshihiro teaches a resistor element 4 that includes an electrode-forming surface (see Examiner's Drawing), which is the substrate 1 where electrodes (2, 3) are formed. Below is a labeled drawing of the reference Toshihiro for the purpose of clarification of the Office Action.



With regards to claim 5, Applicant also argues that Toshihiro does not disclose manufacturing a chip resistor.

The claim is a method counterpart of structure of the claim 1, which is rejected and method steps therefore are inherent for manufacturing a chip resistor.

### ***Conclusion***

Applicant's argument has been fully considered in this Office action. Accordingly, THIS ACTION IS MADE FINAL. See MPEP § 706.07(a). Applicant is reminded of the extension of

time policy as set forth in 37 CFR 1.136(a). A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joselito Baisa whose telephone number is (571) 272-7132. The examiner can normally be reached on M-F 5:30 am to 2:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Elvin Enad can be reached on (571) 272-1990. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.


Application/Control Number:  
10/552,301  
Art Unit: 2832

Page 6

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Joselito Baisa  
Examiner  
Art Unit 2832

jsb

  
ELVIN ENAD  
SUPERVISORY PATENT EXAMINER  
12/17/07